

REMARKS

Claims 1-3 and 8 are pending.

Reconsideration of the application is respectfully requested for the following reasons.

I. The Rejection under 35 USC § 112, First Paragraph

In the Office Action, claim 1 was rejected for failing to include a written description of the following features: “independent of any manual setting entered by a user.” Applicants submit that the specification provides support for these features. See, for example, Paragraph [31] of the specification.

Some of the confusion surrounding this issue may be based on a misunderstanding of the claimed subject matter. By way of clarification, claim 1 recites detecting selection of an automatic washing mode by a user, and then pre-programming parameters into a memory accessible by a control unit of the washing machine. The pre-programmed parameters correspond to the predetermined washing conditions also recited in this claim.

In operation, selection of the automatic washing mode is manually performed by the user. However, once this mode is selected, the remaining claimed steps are automatically performed. During these steps, the automatic washing mode is carried out “based on parameters pre-programmed into a memory.” As presently amended, claim 1 recites that a first set of pre-programmed parameters corresponds to the first predetermined washing condition and a second set of parameters corresponds to the second predetermined washing condition.

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Thus, in accordance with at least one embodiment, the first and second sets of parameters are pre-programmed into the memory before the automatic washing mode is manually selected by the user. These features are supported, for example, by Paragraphs [29] and [31] of the specification, e.g., Paragraph [29] discloses that the parameters corresponding to the first and second washing conditions are previously set-up in the washing machine, and Paragraph [31] discloses a set-up procedure where the parameters are stored in the memory in look-up table form. (Pre-programming of the parameters may be performed, for example, by the manufacturer before the washing machine ever goes to the retailer.)

Thus, before the buyer ever has the washing machine delivered to his home and thus before the automatic mode is selected by the user, the washing machine of the claimed invention has a memory pre-programmed with the parameters that correspond to the first and second washing conditions.

Applicants submit that the foregoing explanation resolves any ambiguity that may have caused the § 112 rejection to have been issued. Applicants further submit that the specification provides a written description of all the features recited in the claims. Withdrawal of the § 112 rejection is therefore respectfully requested.

II. The Rejection under 35 USC § 102/103

Claims 1 and 7-9 were rejected for being anticipated, or obvious, in view of the Cho patent. Applicants traverse this rejection for the following reasons.

To further clarify the distinguishing features of the invention discussed in Applicants' previous reply, claim 1 has been amended to recite that "the first predetermined washing condition corresponds to a first set of parameters pre-programmed and stored into the memory" and that "the second predetermined washing condition corresponds to a second set of parameters pre-programmed and stored into the memory," where the first and second set of parameters are ones that are pre-programmed "independent of any manual setting entered by a user."

In addition, claim 1 recites that "the first set of pre-programmed parameters includes a first time and a first temperature to be used in washing the laundry and wherein the second set of pre-programmed parameters includes a second time and a second temperature to be used in washing the laundry, at least one of the first time or the first temperature being different from the second time or the second temperature respectively." The Cho patent does not teach or suggest these features.

As indicated by the Examiner, the Cho patent discloses a washing machine which allows a user to manually select an automatic washing mode. During the automatic washing mode, certain sub-routines are performed with reference to stored parameters.

However, the Cho patent makes clear that, in order to operate this machine, a user must first enter, in a control panel 10, the time and temperature to be used in washing the clothes. (See column 3, lines 33-35 with reference to step S201 in Figure 3). In view of these disclosures, it is therefore clear that the Cho machine requires a user to manually enter the time and temperature information before the automatic mode is performed.

In contrast, claim 1 has been amended to recite that the time and temperature of a wash are parameters that are pre-programmed into a memory of the washing machine, independent of any manual setting entered by a user. Thus, the claimed invention performs an automatic washing mode based on time and temperature settings that have been pre-programmed into a memory, not based on time and temperature settings that have been manually entered into machine.

These features and the additional features added by amendment to claim 1 distinguish the claimed invention from the Cho patent, both structurally and functionally. Accordingly, it is submitted that claim 1 and its dependent claims are allowable over Cho.

Claims 2 and 3 were rejected for being obvious in view of a Cho-Harwood combination. Harwood discloses a washing machine that automatically determines a load size and then fills a tub with water accordingly. However, Harwood does not teach or suggest the features added by amendment to claim 1, including pre-programming different time/temperatures parameters into a memory to be used in determining how corresponding first and second washing conditions are

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to be performed during an automatic washing mode. Applicants therefore submit that claims 2 and 3 are allowable over a Cho-Harwood combination.

Finally, claims 1-3 and 7-9 were found to be objectionable for failing to indicate where the water temperature is measured. Applicants addressed this issue in the previously reply, and in fact amended claim 1 to indicate where the temperature is being measured. Specifically, claim 1 recites “sensing a temperature of water supplied to a tub of the washing machine from a water supply valve during the automatic washing mode.”

The exact location where the sensing takes place may be different for different embodiments. For example, in one embodiment, the water temperature may be sensed in the tub. In another embodiment, the temperature may be sensed in or from the hoses. The scope of the claims may, therefore, cover both embodiments. What is important is that the temperature of the water supplied to the tub is sensed after the automatic washing mode is selected. Once that temperature is sensed, steps (c) and (d), which include distinguishing features of the invention discussed above, are performed.

In view of the foregoing amendments and remarks, it is respectfully submitted that the application is in condition for allowance. Favorable consideration and timely allowance of the application is respectfully requested.

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To the extent necessary, a petition for an extension of time under 37 CFR § 1.136 is hereby made. Please charge any shortage in fees due in connection with the filing of this, concurrent and future replies, including extension of time fees, to Deposit Account 16-0607 and please credit any excess fees to such deposit account.

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